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Autore	Badiru Adedeji Bodunde <1952->
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Sommario/riassunto	Preface This book presents the mathematical foundation for building and implementing industrial control systems. It contains

mathematically rigorous models and techniques for control systems, in general, with specific orientation toward industrial systems. Industrial control encompasses several types of control systems. Some common elements of industrial control systems include supervisory control and data acquisition systems, distributed control systems, and other generic control system configurations, such as programmable logic controllers, that are often found in industrial operations and engineering infrastructure. Industrial control systems are not limited to production or manufacturing enterprises, as they are typically used in general industries such as electrical, water, oil and gas, and data acquisition devices. Based on information received from remote sensors, automated commands can be sent to remote control devices, which are referred to as field devices. Field devices are used to control local operations. These may include opening and closing valves, tripping breakers, collecting data from sensors, and monitoring local operating conditions. All of these are governed by some form of mathematical representation. Thus, this book has great importance in linking theory and practice. Distributed control systems are used to control industrial processes such as electric power generation, oil and gas refineries, water and wastewater treatment, and chemical, food, and automotive production. --